foreword

he Federal Emergency Management Agency (FEMA) has developed this series of mitigation planning "how-to" guides to assist states, tribes, and communities in enhancing their hazard mitigation planning capabilities.

These guides are designed to provide the type of information states, tribes, and communities need to initiate and maintain a planning process that will result in safer and more disaster-resistant communities. These guides are applicable to states, tribes, and communities of various sizes and varying ranges of financial and technical resources.

This how-to series is not intended to be the last word on any of the subject matter covered; rather, it is meant to provide easy to understand guidance for the field practitioner. In practice, these guides may be supplemented with more extensive technical data and the use of experts when necessary.



mit-i-gate\1: to cause to become less harsh or hostile; 2: to make less severe or painful.

As defined by DMA 2000-

hazard mitigation\: any sustained action taken to reduce or eliminate the long-term risk to human life and property from hazards.

plan-ning\: the act or process of making or carrying out plans; specif: the establishment of goals, policies and procedures for a social or economic unit.

The Disaster Mitigation Act of 2000 In the past, federal legislation has provided fund-

ing for disaster relief, recovery, and some hazard mitigation planning. The Disaster Mitigation Act of 2000 (DMA 2000) is the latest legislation to improve the hazard mitigation planning process. DMA 2000 (Public Law 106-390) was signed by the President on October 30, 2000. The new legislation reinforces the importance of mitigation planning and emphasizes planning for disasters before they occur. As such, DMA 2000 establishes a pre-disaster hazard mitigation program and new requirements for the national post-disaster Hazard Mitigation Grant Program (HMGP).

Section 322 of DMA 2000 specifically addresses mitigation planning at the state and local levels. This section identifies new requirements that allow HMGP funds to be used for planning actions, and increases the amount of HMGP funds available to states that have developed a comprehensive, enhanced mitigation plan prior to a disaster. States, tribes, and communities must have an approved mitigation plan in place before receiving HMGP funds. Local and tribal mitigation plans must demonstrate that their proposed mitigation actions are based on a sound planning process that accounts for the risk to and the capabilities of the individual communities.

State governments have certain responsibilities for implementing Section 322, including:

- Preparing and submitting a standard or enhanced state mitigation plan;
- Reviewing and updating the state mitigation plan every three years;
- Providing technical assistance and training to local governments to assist them in developing local mitigation plans and applying for HMGP grants; and
- Reviewing and approving local plans if the state has an approved enhanced plan and is designated a managing state.

DMA 2000 is intended to facilitate cooperation between state and local authorities. It encourages and rewards local, tribal, and state pre-disaster planning and promotes sustainability as a strategy for disaster resistance. This enhanced planning network will better enable local, tribal, and state governments to articulate their needs for mitigation, resulting in faster allocation of funding and more effective risk reduction projects. To implement the new DMA 2000 requirements, FEMA prepared an Interim Final Rule, published in the Federal Register on February 26, 2002, at 44 CFR Parts 201 and 206, which establishes planning and funding criteria for states, tribes, and local communities.

The how-to guides cover the following topics:

- Getting started with the mitigation planning process, including important considerations for how you can organize your efforts to develop an effective mitigation plan (FEMA 386-1);
- Identifying hazards and assessing losses to your community, tribe, or state (FEMA 386-2);
- Setting mitigation priorities and goals for your community, tribe, or state and writing the plan (FEMA 386-3);
- Implementing the mitigation plan, including project funding and maintaining a dynamic plan that changes to meet new developments (FEMA 386-4);
- Evaluating and prioritizing potential mitigation actions through the use of benefit-cost analysis and other techniques (FEMA 386-5);
- Incorporating special considerations into hazard mitigation planning for historic structures and cultural resources (FEMA 386-6);
- Incorporating mitigation considerations for manmade hazards into hazard mitigation planning (FEMA 386-7);
- Using multi-jurisdictional approaches to mitigation planning (FEMA 386-8); and
- Finding and securing technical and financial resources for mitigation planning (FEMA 386-9).

Why should you spend the time to read these guides?

- It simply costs too much to address the effects of disasters only after they happen;
- State and federal aid is usually insufficient to cover the extent of physical and economic damages resulting from disasters;
- You can prevent a surprising amount of damage from hazards if you take the time to anticipate where and how they occur, and then take the appropriate action to minimize damages;
- You can lessen the impact of disasters and speed the response and recovery process for both natural and manmade hazards; and



■ The most meaningful steps in avoiding the impacts of hazards are taken at the state, tribal, and local levels by officials and community members who have a personal stake in the outcome and the ability to follow through on a sustained process of planning and implementation.

The guides show how mitigation planning:

- Can help your community become more *sustainable and disaster resistant* through selecting the most appropriate mitigation actions, based on the knowledge you gained in the hazard identification and loss estimation process;
- Can be incorporated as an *integral component* of daily government business;
- Allows you to focus your efforts on the hazard areas most important to you by determining and setting priorities for mitigation planning efforts; and
- Can *save you money* by providing a forum for engaging in partnerships that provide the technical, financial, and staff resources in your effort to reduce the effects, and hence the costs, of natural and manmade hazards.

These guides present a range of approaches to preparing a hazard mitigation plan. There is no one right planning process; however, there are certain central themes to planning, such as engaging citizens, developing goals and objectives, and monitoring progress. Select the approach that works best for your state, tribe, or community.

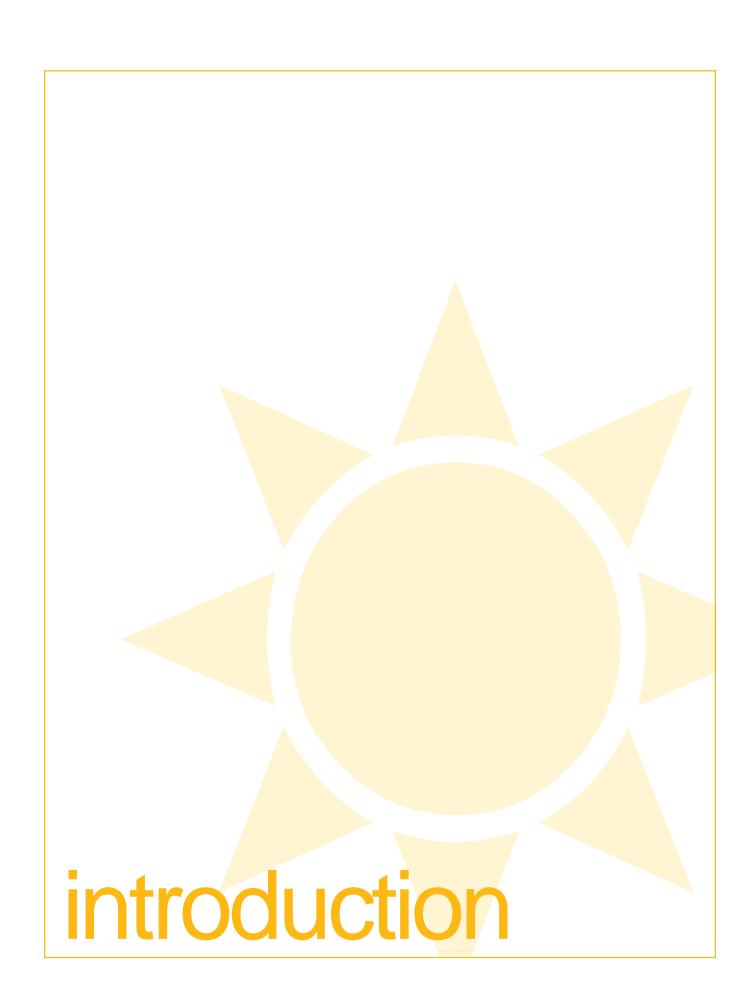


The process used to develop a successful hazard mitigation plan is just as

important as the plan itself.

This how-to guide focuses on the fourth phase of the hazard mitigation planning process and will help you develop a mitigation plan that meets DMA 2000 requirements.





introduction

our community now has a plan that is a result of the planning team's effort and work with stakeholders concerned about reducing losses from hazards in your community. This plan resulted from a process that included a risk assessment, capability assessment, and the development of a mitigation strategy that features prioritized mitigation actions based upon your goals and objectives. The **implementation process** puts your planning team's hard work into motion and focuses on the actions necessary to establish and maintain the effectiveness of the plan as a fundamental tool for risk reduction.

An added benefit of having a plan is that its printed form is familiar, even reassuring, to citizens who have been part of a comprehensive planning process or, even more importantly, have suffered losses due to a hazard. In addition, those new to the community, as well as non-residents, will have easy access to this information as well. The text and accompanying graphics concisely and coherently document the hazards faced by the community, their location and extent, previous losses, actions to mitigate future hazards, and goals for a sustainable future. The development of the plan by community members increases the likelihood of hazard mitigation becoming, like transportation and education, one of the standard considerations in the evolution and growth of the community.

Once the plan has been adopted and the recommendations implemented, your accomplishments, issues, programs, policies, and project results should be accurately documented. This documentation will be very useful when it is time to evaluate, update, or revise the plan. Plans are living documents that require adjustments to maintain their relevance. You and the planning team prepared the mitigation plan to articulate your community's values and strategies at a particular point in time, but like every other plan, it must be reviewed periodically to remain a useful tool to guide growth and change in your community.

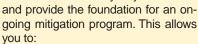
Updates and revisions may be necessary to incorporate changes in your community or tribe, new hazard information, new tribal, community, or state priorities, or lessons learned as mitigation projects are completed. It is recommended, but not required, that you com-



- Organize resources involves organizing resources, mobilizing the community, and getting started with the planning process;
- Assess risks identifies hazards and estimates the losses associated with these hazards;
- Develop a mitigation plan describes how to identify, plan, and initiate cost-effective actions; and
- Implement the plan and monitor progress, the topic of this guide—
 Bringing the Plan to Life: Implementing the Hazard Mitigation Plan (FEMA 386-4)—leads communities and states through the formal adoption of the plan and discusses how to implement, monitor, and evaluate the results of mitigation actions to keep the mitigation plan relevant over time.

The implementation and evaluation processes ensure that

you accomplish the mitigation actions in a timely way

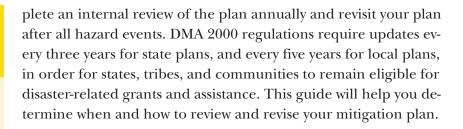


- Ensure that the mitigation strategy is implemented in an effective manner:
- Provide for the long-term institutionalization and monitoring of hazard mitigation practices so that the plan remains relevant in the face of change;
- Establish new protocols. The planning process educates community officials on their roles (and those of their departments) in reducing risks.
 Local officials will need to develop protocols for integrating mitigation principles into their daily job responsibilities; and
- Maintain momentum. The implementation phase is a good time to renew the spirit of cooperation among all partners in the planning process, particularly now that actions to reduce risk are imminent.

States should continually work with local jurisdictions to

ensure that local plans are in conformance with state

guidelines and complement the goals and strategies outlined in the state hazard mitigation plan, particularly as state priorities change.



How do you use this how-to guide?

This guide will help you address the following questions:

1. How can we make sure the plan is officially recognized?

Proof of formal adoption is required under DMA 2000 regulations. Getting the plan adopted ensures the support and approval of the governing authority in your jurisdiction. Step 1, *Adopt the Mitigation Plan*, discusses ways of securing the adoption of the plan by your governing body.

2. What is the most effective mechanism to implement each recommendation? What resources are available? How can we keep the public informed and actively involved now that initiatives are underway?

Your mitigation strategy probably contains various short- and long-term recommendations. While you identified potential sources of funding in the plan, the actual sources of funding, staff time, and staffing needs may change before project implementation gets underway. The planning team always must be on the lookout for alternative sources of funding, new opportunities, and new partnerships through which to carry out the recommendations.

Determining who will bear responsibility for implementing planned actions is key to getting the implementation phase off to a successful start. Ensuring that there are appropriate authorities to implement actions is covered in Step 2, *Implement the Plan Recommendations*.

3. How will we know if our mitigation strategy is working?

Monitoring and evaluating the outcomes of the mitigation actions are essential to knowing whether to stay the course or change it. Step 3, *Evaluate Your Planning Results*, discusses how to determine whether or not the planned course of action has had the desired effect. The successes and limitations of your efforts should be documented as part of the evaluation process.

Celebrating successes, and keeping citizens actively involved and informed of the progress of the hazard mitigation initiatives, are



just as important in the adoption, implementation, and revision phases as in any other phase. Keeping everyone up to date on progress also will help sustain support for mitigation as a local, tribal, or state priority. During the implementation phase, the media will become an especially important tool in communicating the progress of the mitigation plan.

4. When should we reexamine the plan?

As has been noted throughout the how-to series, the community and its assets are constantly changing, requiring the mitigation plan to be updated periodically. While DMA 2000 regulations require a formal review and revision of the community plan once every five years for local jurisdictions and every three years for states, the planning team should reevaluate its implementation strategy as new opportunities, unforeseen challenges, and disasters arise. Additionally, as mitigation issues are resolved, the plan should be reexamined to determine whether there is a need to reprioritize, add, or reconfigure actions in light of what has been accomplished. Step 4, *Revise the Plan*, addresses how to incorporate new knowledge about the community, tribe, or state and ongoing mitigation efforts into your strategy.

Type of information found in the how-to series

The how-to series contains a wide variety of information, some of which is highlighted with icons. Additional information can be found in Appendix B, *Library*. To illustrate how the guide can be used, newspaper articles from the fictional Town of Hazardville are provided.

Icons



Guidance focused solely on the role of **states and tribes** that serve as grantees under HMGP is identified as a sidebar with the **"States"** icon. Tribes that choose to serve as grantees under HMGP should follow the state

icons. Although much of the information will be the same for local, tribal, and state governments, there are different requirements for state and local mitigation plans. Furthermore, states have additional responsibilities to assist local entities in their planning efforts. For tribes that choose to serve as subgrantees under HMGP, guidance focusing on local governments applies to these entities as well.



Be sure to allow sufficient time to complete Phase 4. If you decide to revise the plan, or if you are required to revise it as

described under DMA 2000, consider the time it will take to do the following:

- Include the public and identify any new stakeholders in the evaluation process;
- Gather and evaluate data;
- Brief the public and political leadership;
- Incorporate changes into planning documents; and
- Adopt the new plan.



Under DMA 2000 regulations, local governments may be defined in many different ways. A local government may be defined

by a political boundary, such as an incorporated city, county, parish, or township, or it may not have a distinct political boundary, for example, a watershed or metropolitan region. "Local government" is formally defined in 44 CFR §201.2 of DMA regulations.





The "Advanced" icon indicates an additional step you can take or when specialists may be needed.



The "Caution" icon alerts you to important information and ways to avoid sticky situations later in the planning process.



The "**DMA**" icon provides information relating to the mitigation planning requirements outlined in the Disaster Mitigation Act of 2000 (DMA 2000).



The "Glossary" icon identifies terms and concepts for which a detailed explanation is provided in the Glossary included in Appendix A.



The "Tips" icon identifies helpful hints and useful information that can be used in the planning process.

Library

A mitigation planning "Library" has been included in Appendix B. This library has a wealth of information, including Web addresses, reference books, and other contact information to help get you started. All of the Web sites and references listed in the how-to guide are included in the library.

Town of Hazardville articles

Applications of the various steps in the mitigation planning process are illustrated through a fictional community, the Town of Hazardville, located in the State of Emergency. Hazardville, a small community with limited resources and multiple hazards, is in the process of developing a multi-hazard mitigation plan. Newspaper accounts illustrate the various steps in the mitigation planning process.

Worksheets

Finally, to help track your progress, worksheets have been developed that correspond with the structure of this guide. Worksheets have been completed with Hazardville examples to illustrate the

type of information to include. Blank worksheets are included in Appendix C. You can photocopy the worksheets to record your progress as you undertake the processes of implementing and evaluating the mitigation plan.

The Hazardville Post

Vol. CXIII No. 28 Tuesday, January 28, 2003

Public Responds to Hazardville Mitigation Plan

[Hazardville, EM] The Town of Howard, an advocate for the town's Hazardville Organization for Risk Reduction (THORR) has received over 50 comments regarding the Hazardville Mitigation Plan. The plan was created to help reduce the community's risk to hazards such as flooding, earthquakes, and other natural hazards.

Joe Norris, lead planner for THORR, said the team has been working closely with citizens, businesses, and other community representatives to develop a plan that would create a safer, more resilient Hazardville. THORR was committed to having community input throughout the planning process. "At first, we had a hard time getting the community interested. The citizens didn't know what to expect," Norris said.

Many in the community were skeptical of exactly what the plan was supposed to accomplish. Riley less privileged citizens in the Raging River Views Park was perhaps the most outspoken opponent of the plan. At first, Howard worried that the benefits of this plan might not help the people he felt needed it the most.

"I have tried for years to get the community to help the poor residents in the low-income neighborhood who get flooded out every spring when the snow begins to melt. The town never knew how they could help the residents other than to assist in clean-up and debris removal. The residents could not afford to relocate on their own. All of the houses that are affected vear after vear were identified in the hazard identification and risk assessment as being in a 10-year flood zone, and are very vulnerable to any sort of flash floods or even a heavy rain." (A 10-year flood has a 10 percent chance of occurring in any one

"While I was deeply saddened by this information," Howard said, "I was relieved to see that it turned out to be a good thing after all. Once the town and the Council learned what a dangerous area that was, the entire neighborhood was prioritized for buyouts, which will allow these residents to get fair market value for their home and help them move out of harm's way."

In an interview, THORR's outreach coordinator, Charity Jones, who works for the Hazardville Department of Health and Human Services, said, "The citizens of Hazardville should feel good about what they did to develop this plan. I know I am proud of all the work that THORR and Hazardville community members have put into its creation. This is truly a plan driven by the community's concerns and needs."

